



# Australian Bureau of Statistics

## 6291.0.55.001 - Labour Force, Australia, Detailed - Electronic Delivery, Apr 2015

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## Summary

### Main Features

Data from the monthly Labour Force Survey are released in two stages. The Labour Force, Australia, Detailed - Electronic Delivery (cat. no. 6291.0.55.001) and Labour Force, Australia, Detailed, Quarterly (cat. no. 6291.0.55.003) are part of the second release, and include detailed data not contained in the Labour Force, Australia (cat. no. 6202.0) product set, which is released one week earlier.

The Labour Force, Australia, Detailed - Electronic Delivery (cat. no. 6291.0.55.001) is released monthly. Labour Force, Australia, Detailed, Quarterly (cat. no. 6291.0.55.003) includes data only collected in February, May, August and November (including industry and occupation).

Since these products are based on the same data as the Labour Force, Australia (cat. no. 6202.0) publication, the 6202.0 Labour Force, Australia Explanatory Notes are relevant to both releases.

## What's New in the Labour Force

### WHAT'S NEW IN THE LABOUR FORCE

#### CHANGES TO LABOUR FORCE OUTPUTS

This note is essential for all clients who rely on the Labour Force spreadsheets and data cubes.

Commencing with the May 2015 issues (released in June 2015) of this publication, *Labour Force, Australia* (cat. no. 6202.0) and the detailed quarterly publication (cat. no. 6291.0.55.003), the ABS will start publishing data as indicated in the Information Paper: *Forthcoming Changes to Labour Force Statistics*, October 2014 (cat. no. 6292.0).

The May 2015 issues will present data in new spreadsheets and data cubes according to the formats presented in the blank templates attached to the above information paper. On 28 May 2015 the ABS will publish data, as released in the April 2015 issues, in new format spreadsheets and data cubes attached to a new issue of the information paper (cat. no. 6292.0). At the same time the timetable attached to the information paper will be updated.

The release of the new format spreadsheets and data cubes with data as at April 2015 will allow users to fully test systems and become familiar with the new outputs before the official first release with the May 2015 issues (released in June 2015). Clients who rely on the Labour Force spreadsheets and data cubes are encouraged to use the templates to ensure that their processes can continue to access the correct data once the new outputs are implemented.

While the format of the outputs may change, the data released in the May 2015 issues will be the same as that released with the April 2015 issues, when rounded to the nearest person, apart from the usual revisions to the seasonally adjusted and trend estimates when the next observation is added.

Monthly underutilisation (original series only until 2017) will be included from the August 2015 issue of this publication. In addition, the following new items are currently planned for release in the August 2015 issue of the detailed quarterly publication (cat. no. 6291.0.55.003):

- Educational attainment
- Educational attendance for whole civilian population
- Volume measures of labour underutilisation
- Leave entitlements
- Retrenchment
- Sector of employment (public/private).

The new outputs result from a review conducted in 2010-11 of the labour household survey program. The outcomes of the review were announced in 2012 but implementation has been delayed while priority was given to investigations into recent Labour Force results, the annual seasonal reanalysis and comprehensive testing of the system producing the new outputs.

The front cover and commentary of the pdf will not change with the May 2015 issue but the pdf tables will reflect changes made to the spreadsheets. For further details around changes to tables in the pdf refer to the timetable attached to the information paper.

## Update on Recommendations from Independent Technical Review

### UPDATE ON RECOMMENDATIONS FROM INDEPENDENT TECHNICAL REVIEW

The Executive Summary of an independent technical review into the Labour Force Survey (LFS) and the ABS response to the review's recommendations were released on the ABS website on 9 December 2014. For details see the November 2014 issue of *Labour Force, Australia* (cat. no. 6202.0). This note provides an update on recommendation 4 of the review which related to the response rates achieved in the LFS. Recommendation 4 of the review and the ABS response are:

**Recommendation 4:** It is possible that the lower response rates may be having an effect on the estimates of employment and/or unemployment. The impact of lower response rates should be analysed further.

**ABS Response:** Agree and is in progress. Findings will be reported in early 2015. The ABS

remains committed to maintaining response rates in the 93-95% range.

The independent technical review noted that "The LFS response rates have fallen from about 96% to 93% between the beginning of 2013 and September 2014. Analysis of the final 2-4% of responses in earlier years indicated that these last responses were not significantly different from the initial response. As a result, it was concluded that a drop in the response rates from 95-96% to about 93-95% should not have a significant effect on the LFS estimates."

The analysis referred to in the above quote from the independent technical review was undertaken by the ABS prior to a decision to refine, from February 2014, collection procedures for the LFS. The ABS has had increasing difficulty contacting persons selected in the survey due to changes in lifestyles. This had led to significant increases in costs which were not sustainable. Achieving the previous response rates which typically ranged from 95 to 97% each month had become increasingly difficult. As well as having cost implications, this often resulted in increased collection time exposing the statistical process to risks due a smaller window for producing results while maintaining the timeliness of the publication.

As part of a broader program to enhance the cost-effectiveness, efficiency and timeliness of ABS response follow-up strategies, while maintaining the high quality of its statistics, the ABS refined several aspects of its contact with householders including reducing the LFS enumeration period to 21 days. As a result, the LFS response rate was expected to range from 93 to 95% each month compared to previous typical response rates of 95 to 97%.

While the independent technical review concluded that "There is no indication that the lower response rates are biasing the LFS results; rather, if they are having an effect then it is likely to show up as increased noise in the estimates", the review recommended further analysis be undertaken on the response rates. The summary results of analysis into the impact of lower response rates due to a shorter enumeration period are presented in this article.

Prior to the reduction in response rate target (and related enumeration changes) in February 2014 the ABS investigated the impact of reducing the enumeration period from 25 to 21 days. The investigation selected several years of monthly LFS responses back to 2006 and assessed the impact on key survey estimates at the national and state level. Those who responded to the survey on day 22 or beyond were dropped from the dataset and key estimates recalculated. The investigation concluded that under a 21 day collection period there would be, on average, a 1.7 percentage point drop in the response rate and there would not be any significant impact on the tested estimates. The expected change for each of the key estimates at the national and state levels was minimal and of a magnitude much less than one standard error. The results of the investigation are available on request.

The ABS has conducted further analysis to understand the impact on key labour force estimates since February 2014 of missing late respondents due to lower response rates induced by a shorter enumeration period. There were three important areas of analysis.

First, the ABS examined whether the shorter enumeration period had altered non-response behaviour among households selected in the LFS. In particular, whether there was more "learned" non-response as a result of the shorter enumeration period (i.e. a household responded when first selected in the sample but stopped responding as their time in the sample progressed). Participation in the survey was monitored for individual respondents to identify if response patterns changed before and after the implementation of the shorter enumeration period. The analysis concluded that while there was a small increase in "learned" non-response it was unlikely to be large enough to influence the key labour force estimates.

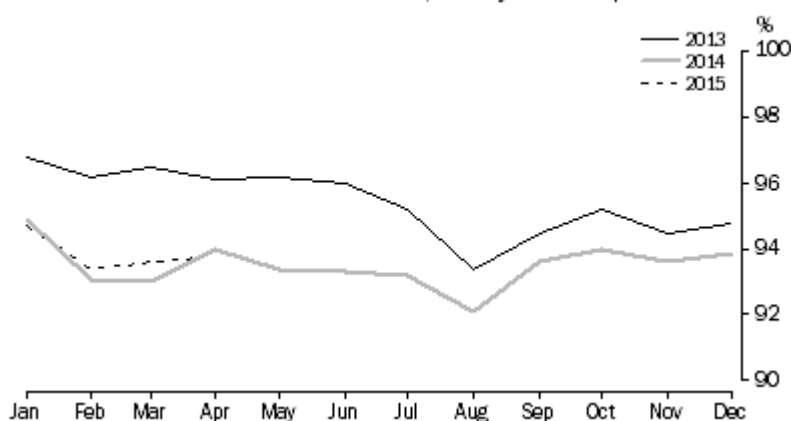
Second, the ABS investigated whether missing late respondents due to response rates lower than the target 93 to 95% would impact key labour force estimates. A national response rate outside this target has only occurred once since the enumeration period changed in February 2014; this was in August 2014 when the national response rate was 92.1%. An increasing proportion of late respondents were removed to study the impact on the labour force estimates. The results indicated that while a minor decrease of 2 percentage points below 93% would not significantly impact the key labour force estimates, a much larger decrease in the response rate would bias the level of the employment estimates downward and the not in the labour force estimates upwards.

Finally the ABS investigated whether household response patterns over the enumeration period differed before and after February 2014. This analysis found there were slightly more responses early in the enumeration period but this was consistent across all labour force statuses. There is no evidence to invalidate previous investigations which found that shortening the enumeration period would not significantly impact estimates.

The data used in the pre-February 2014 investigations was prior to e-form self enumeration being offered to all LFS rotation groups from April 2014. However, the analysis described above suggests that late and non-responding units have similar characteristics before and after the e-form offer, indicating there is no evidence of interaction between the shorter enumeration period and e-form take up.

The following chart shows the monthly response rates achieved at the national level since January 2013. The response rates achieved in 2013 are higher than those for 2014 and 2015 reflecting that the reduction in response rate target and related enumeration changes were introduced in February 2014. The response rate for each August is typically lower than other months which is attributed to the supplementary survey conducted with the LFS each August. The response rates for the Australian LFS remain high by international standards.

LABOUR FORCE SURVEY RESPONSE RATES, January 2013 to April 2015



## Article Archive

This section provides an archive of articles and analysis published in Labour Force, Australia (cat. no. 6202.0), promoting the effective use of labour force statistics. Articles are sorted by publication date.

Articles on labour related topics are also available in Australian Labour Market Statistics (cat. no. 6105.0) and Australian Social Trends (cat. no. 4102.0).

## Labour Force Survey Archive

This section provides an archive of articles and analysis published in Labour Force, Australia (cat. no. 6202.0), promoting the effective use of labour force statistics. Articles are sorted by publication date.

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## Labour Force Survey Archive

What's New in the Labour Force	March 2015
Annual Seasonal Reanalysis	March 2015
Update on Recommendations from the Independent Technical Review	March 2015
What's new in the Labour Force	February 2015
Online Collection in the Labour Force Survey	February 2015
Rebenchmarking Labour Force Estimates	February 2015
What's new in the Labour force	January 2015
What's new in the Labour force	December 2014
Independent Technical Review into the Labour Force Survey and ABS Response	November 2014
What's new in the Labour force	November 2014
Removing the effect of Supplementary Surveys from seasonally adjusted estimates	October 2014
Changes in this and upcoming labour force issues	September 2014
Changes in this and upcoming labour force issues	August 2014
What's new in the Labour force	July 2014
What's new in the Labour force	June 2014
What's new in the Labour force	May 2014
What's new in the Labour force	February 2014
Rebenchmarking Labour Force Estimates to the 2011 Census of Population and Housing	January 2014
What's new in the Labour force	December 2013
Understanding the Australian Labour Force using ABS statistics	December 2013
What's new in the Labour Force	November 2013
Understanding full-time/part-time status in the Labour Force Survey	September 2013
What's new in the Labour Force	September 2013
Fact sheet did you know - Underemployment	June 2013
What's new in the Labour Force	June 2013
New Labour Force Sample Design	May 2013
Annual Seasonal Reanalysis	May 2013
What's new in Labour Force	May 2013
Transition to online collection of the Labour Force Survey	April 2013
What's new in Labour Force	April 2013
Estimating Jobs in the Australian Labour Market	February 2013
Forthcoming improvements to the content of the Labour Force and Labour Supplementary Surveys	January 2013
What's new in Labour Force	January 2013
Understanding the Australian Labour Force using ABS statistics	January 2013
Rebenchmarking of Labour Force Series	November 2012
Upcoming changes to the Labour Force Survey	July 2012

Labour Household Surveys content review and the Labour Force Survey	June 2012
Employment and mining in Queensland, New South Wales and Western Australia	May 2012
ABS Response to recent concerns expressed about employment estimates	April 2012
Population Benchmarks and Labour Force Survey	April 2012
Annual Seasonal Reanalysis	March 2012
Exploring Labour Force Data on joblessness	February 2012
Employment level estimates versus employment to population explained	January 2012
Understanding the Australian Labour Force using ABS statistics	November 2011
Historical Revisions	February 2011
Impact of the floods on the Labour Force Survey	January 2011

## About this Release

A range of Excel spreadsheets and SuperTABLE datacubes. The monthly spreadsheets contain broad level data covering all the major items of the Labour Force Survey in time series format, including seasonally adjusted and trend estimates. The monthly datacubes contain more detailed and cross classified original data than the spreadsheets.

# Explanatory Notes

## Explanatory Notes

Data from the monthly Labour Force Survey are released in two stages. The Labour Force, Australia, Detailed - Electronic Delivery (cat. no. 6291.0.55.001) and Labour Force, Australia, Detailed, Quarterly (cat. no. 6291.0.55.003) are part of the second release, and include detailed data not contained in the Labour Force, Australia (cat. no. 6202.0) product set, which is released one week earlier.

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## Quality Declaration - Summary

### QUALITY DECLARATION - SUMMARY

## **INSTITUTIONAL ENVIRONMENT**

Labour Force statistics are compiled from the Labour Force Survey which is conducted each month throughout Australia as part of the Australian Bureau of Statistics (ABS) household survey program. For information on the institutional environment of the ABS, including the legislative obligations of the ABS, financing and governance arrangements, and mechanisms for scrutiny of ABS operations, please see ABS Institutional Environment.

## **RELEVANCE**

The Labour Force Survey provides monthly information about the labour market activity of Australia's resident civilian population aged 15 years and over. The Labour Force Survey is designed to primarily provide estimates of employment and unemployment for the whole of Australia and, secondarily, for each state and territory.

## **TIMELINESS**

The Labour Force Survey enumeration begins on the Sunday between the 5th and 11th of the month, except for the Christmas and New Year holiday period. In December enumerations starts between the 3rd and 9th (4 weeks after November enumeration begins). In January enumeration starts between the 7th and 13th (5 weeks after December enumeration begins).

Key estimates from the Labour Force Survey are published in two stages. The first, Labour Force, Australia (cat. no. 6202.0), is released 32 days after the commencement of enumeration for the month, with the exception of estimates for December which are published 39 days after the commencement of enumeration.

The second stage includes detailed data that were not part of the first stage and are published in Labour Force, Australia, Detailed - Electronic Delivery (cat. no. 6291.0.55.001) and Labour Force, Australia, Detailed, Quarterly (cat. no. 6291.0.55.003). The second stage is released 7 days after the first stage.

## **ACCURACY**

The Labour Force Survey is based on a sample of private dwellings (approximately 26,000 houses, flats etc) and non-private dwellings, such as hotels and motels. The sample covers about 0.32% of the Australian civilian population aged 15 years or over. The Labour Force Survey is designed primarily to provide estimates of key labour force statistics for the whole of Australia and, secondarily, for each state and territory.

Two types of error are possible in an estimate based on a sample survey: non-sampling error and sampling error.

Non-sampling error arises from inaccuracies in collecting, recording and processing the data. Every effort is made to minimise reporting error by the careful design of questionnaires, intensive training and supervision of interviewers, and efficient data processing procedures. Non-sampling error also arises because information cannot be obtained from all persons selected in the survey. The Labour Force Survey receives a high level of cooperation, with an average response rate for the last year being 94%.

Sampling error occurs because a sample, rather than the entire population, is surveyed.

One measure of the likely difference resulting from not including all dwellings in the survey is given by the standard error. There are about two chances in three that a sample estimate will differ by less than one standard error from the figure that would have been obtained if all dwellings had been included in the survey, and about nineteen chances in twenty that the difference will be less than two standard errors.

Standard errors of key estimates and movements since the previous month are available in Labour Force, Australia (cat. no. 6202.0). The standard error of other estimates and movements may be calculated by using the spreadsheet contained in Labour Force Survey Standard Errors, Data Cube (cat. no. 6298.0.55.001).

## **COHERENCE**

The ABS has been conducting the Labour Force Survey each month since February 1978. While seeking to provide a high degree of consistency and comparability over time by minimising changes to the survey, sound survey practice requires careful and continuing maintenance and development to maintain the integrity of the data and the efficiency of the collection.

The changes which have been made to the Labour Force Survey have included changes in sampling methods, estimation methods, concepts, data item definitions, classifications, and time series analysis techniques. In introducing these changes the ABS has generally revised previous estimates to ensure consistency and coherence with current estimates. For a full list of changes made to the Labour Force Survey see Chapter 20 in Labour Statistics: Concepts, Sources and Methods (cat. no. 6102.0.55.001).

## **INTERPRETABILITY**

The key estimates from the Labour Force Survey are available as original, seasonally adjusted and trend series. Seasonal adjustment is a means of removing the effects of normal seasonal variation from the series so other influences on the series can be more clearly recognised. Seasonal adjustment does not aim to remove the irregular influences which may be present and therefore month-to-month movements may not be reliable indicators of underlying behaviour. To assist in interpreting the underlying behaviour, the ABS produces the trend series by smoothing the seasonally adjusted series to reduce the impact of the irregular component. For further information, see A Guide to Interpreting Time Series - Monitoring Trends (cat. no. 1349.0).

Further information on the terminology and other technical aspects associated with statistics from the Labour Force Survey can be found in the publication Labour Force, Australia (cat. no. 6202.0), which contains detailed Explanatory Notes, Standard Error information and a Glossary.

## **ACCESSIBILITY**

Please see the Related Information tab for the list of products that are available from this collection.

# **Time Series Spreadsheet (I-Note) - Time Series**



## **Spreadsheet**

Data relating to unemployed persons looking for first full-time job is not available from July 2014. As highlighted in the Information Paper: Forthcoming Changes to Labour Force Statistics (cat. no. 6292.0), duration of unemployment since last full-time job is no longer collected in the Labour Force Survey questionnaire from July 2014. As this information is used, in part, to identify whether a currently unemployed person has been employed full-time in the past, unemployed persons looking for first full-time job is no longer able to be derived on a comparable basis and is therefore not available. This specific series had been highlighted to be removed with the introduction of new labour force outputs, but this has been brought forward.

## **Time Series Spreadsheet (I-Note) - Time Series Spreadsheet**

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## **Time Series Spreadsheet (I-Note) - Time Series Spreadsheet**

As part of the Labour Force change program the ABS has made changes to the standard for Status in Employment and the new questionnaire introduced in July no longer allows persons to be classified according to the old standard. Specifically it is no longer possible to classify persons who work for a commission without a retainer on a consistent basis with the old questionnaire. The changes to the questionnaire came into effect from July 2014, however the changes to the output will not be incorporated until the release of new Labour

Force outputs. The main changes to the standard involve new groups for Owners/Managers of Incorporated Enterprises, and a small change to the definition of employees to include persons paid by commission without a retainer. Previously persons working for a commission without a retainer were classified as either Employers or Own Account Workers. With the change to the questionnaire, it is not possible to assign this group to the appropriate category in the current standard due to questionnaire sequencing. Persons who worked for a commission without a retainer have been classified to the appropriate category in the current standard based on the distribution in the corresponding month in 2013. When the first lot of new content is introduced the entire series will be revised to be consistent with the revised standard back to 1991.

## **Time Series Spreadsheet (I-Note) - Time Series Spreadsheet**

April 2015 saw a proportionally larger than usual move towards employed persons working less than 35 hours during the reference period. This is likely to be because of the overlap of the Easter holiday period with the April survey reference period, meaning respondents whose usual hours worked were greater than 35 hours per week actually worked less than this amount during the reference period. The timing of Easter is adjusted for as part of the estimation of seasonally adjusted aggregate monthly hours worked, which showed an increase of 1.1% during April 2015.

## **Time Series Spreadsheet (I-Note) - Time Series Spreadsheet**

Due to the flooding in Queensland in January 2011, the relative standard errors for January 2011 will vary across regions and will be higher than normal in some regions. The RSEs for the Darling Downs-South West and Ipswich City Statistical Regions are expected to be approximately 50% higher, while the RSEs for the Brisbane City Inner Ring Statistical Region will increase by approximately 25%. The Brisbane City Outer Ring, West Moreton and Mackay-Fitzroy-Central West Statistical Regions will have RSEs approximately 10% higher. All other regions have minimal differences. However from February 2011, the data returns to normal. Refer to the article Impact of the floods on the Labour Force Survey in January 2011 for more information.

The new labour force sample was phased-in over four months from May to August 2013. See the article on page 10 of the May 2013 issue of Labour Force, Australia (cat. no. 6202.0) for more information. During phase in of the new sample, standard errors associated with key labour force data were expected to increase by approximately 10% at a national level, however increased standard errors and variability in the estimates may be more evident in detailed regional data during this time.

## **Data Cubes (I-Note) - Data Cubes**

Due to the flooding in Queensland in January 2011, the relative standard errors for January 2011 will vary across regions and will be higher than normal in some regions. The RSEs for

the Darling Downs-South West and Ipswich City Statistical Regions are expected to be approximately 50% higher, while the RSEs for the Brisbane City Inner Ring Statistical Region will increase by approximately 25%. The Brisbane City Outer Ring, West Moreton and Mackay-Fitzroy-Central West Statistical Regions will have RSEs approximately 10% higher. All other regions have minimal differences. However from February 2011, the data returns to normal. Refer to the article Impact of the floods on the Labour Force Survey in January 2011 for more information.

The new labour force sample was phased-in over four months from May to August 2013. See the article on page 10 of the May 2013 issue of Labour Force, Australia (cat. no. 6202.0) for more information. During phase in of the new sample, standard errors associated with key labour force data were expected to increase by approximately 10% at a national level, however increased standard errors and variability in the estimates may be more evident in detailed regional data during this time.

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## Standard Errors

Estimates from the Labour Force Survey (LFS) are based on information collected from people in a sample of dwellings, rather than the entire population. Hence the estimates produced may differ from those that would have been produced if the entire population had been included in the survey. The most common measure of the likely difference (or 'sampling error') is the **standard error** (SE).

The ABS considers that estimates with a relative standard error of 25% or more may be subject to sampling variability too high for most practical purposes.

To determine if an item has a relative standard error of 25% or more, in SuperTABLE, right click in the centre of the table, select annotate cells - standard annotations, and select 'Annotate RSE cut-off values'.

To indicate those cells in spreadsheets with a relative standard error of 25% or more, annotations have been applied prior to dissemination.

In addition, the tables below have been supplied to show estimates at which the relative standard error is 25%. Estimates of the size indicated in the tables, or smaller, are considered to be subject to sampling variability too high for most practical purposes.

Due to the January 2011 flooding in Queensland the relative standard errors for January 2011 will be higher than normal in some regions, therefore for Queensland the estimates at which the relative standard error is 25% will be higher than they appear in the tables below. However from February, the data returns to normal.

The new labour force sample was phased-in over four months from May to August 2013. During phase in of the new sample, standard errors associated with key labour force data were expected to increase by approximately 10% at a national level, however increased standard errors and variability in the estimates may be more evident in detailed regional data during this time.

The RSEs for July 2013 (50% old sample, 50% new sample) and onwards will be subject to revisions in the future, as more information is known about the new sample after it has been introduced.

Additional information on how standard errors for LFS estimates are produced is available in Labour Force Survey Standard Errors, Data Cube (cat. no. 6298.0.55.001).

<b>State</b>	<b>NSW</b>	<b>Vic</b>	<b>Qld</b>	<b>SA</b>	<b>WA</b>	<b>Tas</b>	<b>NT</b>	<b>ACT</b>	<b>Aust</b>
<b>Employed</b>									
Feb-78 — Sep-82	4.5	4.5	3.5	2.5	2.5	1.5	1.8	2.0	4.5
Oct-82 — Aug-87	4.0	4.0	3.0	1.8	2.0	1.0	1.8	1.3	3.5
Sep-87 — Feb-89	4.5	4.5	3.0	2.0	2.5	1.3	1.8	1.5	4.0
Mar-89 — Aug-92	4.5	4.5	3.0	2.1	2.3	1.3	2.0	1.4	3.5
Sep-92 — Aug-97	5.3	4.6	3.5	2.4	2.9	1.3	1.3	1.0	4.0
Sep-97 — Sep-98	5.9	4.5	4.1	2.4	2.8	1.1	1.0	1.1	4.4
Oct-98 — Feb-03	5.9	3.1	3.7	2.5	2.2	1.1	1.3	0.9	5.5
Mar-03 — Oct-07	6.3	3.0	4.4	2.3	2.5	1.3	1.5	1.1	6.6
Nov-07	6.2	3.2	4.3	2.3	2.5	1.3	1.4	1.1	6.4
Dec-07	6.1	3.4	4.3	2.3	2.6	1.3	1.3	1.1	6.2
Jan-08	6.0	3.6	4.2	2.3	2.6	1.3	1.3	1.2	6.0
Feb-08	5.9	3.8	4.2	2.4	2.7	1.3	1.2	1.2	5.9
Mar-08	5.9	4.1	4.2	2.4	3.0	1.2	1.1	1.2	5.7
Apr-08	5.8	4.4	4.4	2.5	3.1	1.3	1.0	1.3	5.6
May-08	5.7	4.7	4.3	2.5	3.1	1.3	1.0	1.3	5.4
Jun-08	5.5	4.9	4.3	2.5	3.3	1.3	1.0	1.3	5.3
Jul-08 — Aug-09	6.9	6.1	5.3	3.1	4.0	1.5	1.2	1.6	7.4
Sep-09	6.5	5.8	5.0	2.9	3.8	1.5	1.1	1.5	7.0
Oct-09	6.1	5.5	4.7	2.8	3.6	1.4	1.0	1.4	6.5
Nov-09	5.8	5.2	4.5	2.6	3.4	1.3	1.0	1.4	6.2
Dec-09 — Jun-13	5.5	4.9	4.3	2.5	3.3	1.3	1.0	1.3	5.8
Jul-13 — Jan-14	7.7	3.8	5.5	2.7	3.8	1.4	0.3	1.7	7.8
Feb-14 onwards	7.9	3.9	5.6	2.7	3.8	1.4	0.3	1.7	7.9
<b>Unemployed</b>									
Feb-78 — Sep-82	4.5	4.5	3.5	2.5	2.5	1.5	1.8	2.0	4.5
Oct-82 — Aug-87	4.0	4.0	3.0	1.8	2.0	1.0	1.8	1.3	3.5

Sep-87 — Feb-89	4.5	4.5	3.0	2.0	2.5	1.3	1.8	1.5	4.0
Mar-89 — Aug-92	4.5	4.5	3.0	2.1	2.3	1.3	2.0	1.4	3.5
Sep-92 — Aug-97	5.3	4.6	3.5	2.4	2.9	1.3	1.3	1.0	4.0
Sep-97 — Sep-98	5.9	4.5	4.1	2.4	2.8	1.1	1.0	1.1	4.4
Oct-98 — Feb-03	5.7	5.7	4.5	2.6	3.3	1.3	3.2	1.4	4.9
Mar-03 — Oct-07	6.0	5.4	4.9	2.9	3.6	1.6	2.2	1.6	5.2
Nov-07	6.1	5.4	5.0	2.9	3.7	1.6	2.1	1.7	5.2
Dec-07	6.2	5.5	5.0	2.9	3.8	1.7	1.9	1.7	5.2
Jan-08	6.3	5.6	5.0	3.0	4.0	1.7	1.8	1.8	5.2
Feb-08	6.4	5.7	5.1	3.0	4.1	1.7	1.7	1.8	5.1
Mar-08	6.7	5.7	5.2	3.1	4.5	1.8	1.6	1.9	5.1
Apr-08	6.8	5.9	5.5	3.2	4.6	1.9	1.5	1.9	5.2
May-08	6.9	6.0	5.5	3.3	4.8	1.9	1.4	2.0	5.1
Jun-08	7.1	6.1	5.6	3.3	5.0	1.9	1.4	2.1	5.1
Jul-08 — Aug-09	9.3	8.0	7.4	4.4	6.6	2.5	1.8	2.8	7.3
Sep-09	8.7	7.5	6.8	4.1	6.1	2.4	1.6	2.5	6.8
Oct-09	8.1	7.0	6.4	3.8	5.7	2.2	1.5	2.4	6.4
Nov-09	7.5	6.5	6.0	3.5	5.3	2.1	1.5	2.2	6.0
Dec-09 — Jun-13	7.1	6.1	5.6	3.3	5.0	1.9	1.4	2.1	5.7
Jul-13 — Jan-14	7.3	6.6	8.4	3.7	5.8	1.7	1.3	2.2	7.1
Feb-14 onwards	7.4	6.7	8.6	3.8	5.9	1.8	1.3	2.3	7.3

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Feb-78 — Sep-82	4.5	4.5	3.5	2.5	2.5	1.5	1.8	2.0	4.5
Oct-82 — Aug-87	4.0	4.0	3.0	1.8	2.0	1.0	1.8	1.3	3.5
Sep-87 — Feb-89	4.5	4.5	3.0	2.0	2.5	1.3	1.8	1.5	4.0
Mar-89 — Aug-92	4.5	4.5	3.0	2.1	2.3	1.3	2.0	1.4	3.5
Sep-92 — Aug-97	5.3	4.6	3.5	2.4	2.9	1.3	1.3	1.0	4.0
Sep-97 — Sep-98	5.9	4.5	4.1	2.4	2.8	1.1	1.0	1.1	4.4
Oct-98 — Feb-03	6.4	3.7	4.1	3.2	2.7	1.2	1.4	1.1	6.0
Mar-03 — Oct-07	7.8	3.7	5.2	3.0	3.2	1.5	2.0	1.3	7.3
Nov-07	7.6	3.9	5.1	3.0	3.2	1.5	1.8	1.3	7.0
Dec-07	7.4	4.1	5.1	3.0	3.3	1.5	1.7	1.4	6.8
Jan-08	7.3	4.4	5.0	3.0	3.4	1.5	1.6	1.4	6.6
Feb-08	7.1	4.7	5.0	3.1	3.5	1.5	1.5	1.4	6.3
Mar-08	7.1	5.0	4.9	3.1	3.8	1.5	1.3	1.5	6.2
Apr-08	7.0	5.4	5.3	3.2	3.9	1.5	1.2	1.5	6.0
May-08	6.8	5.7	5.2	3.2	4.0	1.5	1.1	1.6	5.8
Jun-08	6.6	6.0	5.2	3.2	4.1	1.5	1.1	1.6	5.6
Jul-08 — Aug-09	8.3	7.6	6.5	4.0	5.2	1.8	1.4	2.0	8.0
Sep-09	7.8	7.2	6.1	3.7	4.9	1.7	1.3	1.9	7.4
Oct-09	7.3	6.7	5.8	3.5	4.6	1.6	1.2	1.8	6.9
Nov-09	6.9	6.4	5.4	3.3	4.4	1.6	1.2	1.7	6.5
Dec-09 — Jun-13	6.6	6.0	5.2	3.2	4.1	1.5	1.1	1.6	6.2
Jul-13 — Jan-14	8.4	4.4	9.8	3.6	4.5	1.8	0.7	2.5	9.0
Feb-14 onwards	8.5	4.5	9.9	3.7	4.6	1.8	0.8	2.5	9.1

Greater Capital City Statistical Areas	Feb-78 — Sep-82	Oct-82 — Aug-87	Sep-87 — Feb-89	Mar-89 — Aug-92	Sep-92 — Aug-97	Sep-97 — Oct-98 Sep-98	Oct-98 — Feb-03
Greater Sydney	4.5	4.0	4.5	4.5	5.3	5.7	5.8
Rest of NSW	4.5	4.0	4.5	4.5	5.3	5.7	5.8
Greater Melbourne	4.5	4.0	4.5	4.5	4.6	4.6	3.3
Rest of Victoria	4.5	4.0	4.5	4.5	4.6	4.3	3.2

Greater Brisbane	3.5	3.0	3.0	3.0	3.5	3.7	3.4
Rest of Queensland	3.5	3.0	3.0	3.0	3.6	4.3	3.6
Greater Adelaide	2.5	1.8	2.0	2.1	2.4	2.4	2.7
Rest of South Australia	2.5	1.8	2.0	2.1	2.5	2.2	2.5
Greater Perth	2.5	2.0	2.5	2.3	2.9	2.6	2.3
Rest of Western Australia	2.5	2.0	2.5	2.3	2.9	2.8	2.2
Greater Hobart	1.5	1.0	1.3	1.3	1.3	1.1	0.9
Rest of Tasmania	1.5	1.0	1.3	1.3	1.3	1.1	1.1

**Mar-03**   **Mar-08**   **Jul-08 — Nov-09**   **Jul-13 — Feb-14**  
**—**   **—**   **Oct-09**   **—**   **Jan-14**   **onwards**  
**Feb-08**   **Jun-08**   **Jun-13**

Greater Sydney	6.5	5.7	7.1	5.7	7.6	7.7
Rest of NSW	6.4	5.6	7.0	5.6	7.5	7.6
Greater Melbourne	3.2	5.1	6.4	5.1	4.0	4.0
Rest of Victoria	3.1	5.0	6.3	5.0	3.9	3.9
Greater Brisbane	4.1	4.0	5.0	4.0	5.9	6.0
Rest of Queensland	4.4	4.3	5.4	4.3	6.3	6.4
Greater Adelaide	2.5	2.7	3.4	2.7	3.0	3.0
Rest of South Australia	2.4	2.5	3.1	2.5	2.8	2.8
Greater Perth	2.6	3.5	4.3	3.5	3.9	4.0
Rest of Western Australia	2.5	3.3	4.1	3.3	3.7	3.8
Greater Hobart	1.1	1.1	1.4	1.1	1.3	1.3
Rest of Tasmania	1.3	1.3	1.6	1.3	1.5	1.5

<b>Statistical Area Level 4 Regions</b>	<b>Oct-98</b>	<b>Mar-03</b>	<b>Mar-08</b>	<b>Jul-08</b>	<b>Nov-09</b>	<b>Jul-13</b>	<b>Feb-14 onwards</b>
	<b>—</b>	<b>—</b>	<b>—</b>	<b>—</b>	<b>—</b>	<b>—</b>	
	<b>Feb-03</b>	<b>Feb-08</b>	<b>Jun-08</b>	<b>Oct-09</b>	<b>Jun-13</b>	<b>Jan-14</b>	
Central Coast	7.4	8.5	7.2	9.4	7.2	10.2	10.4
Sydney - Baulkham Hills and Hawkesbury	7.2	8.3	7.0	9.2	7.0	10.0	10.2
Sydney - Blacktown	7.3	8.3	7.1	9.3	7.1	10.0	10.2
Sydney - City and Inner South	8.5	9.7	8.3	10.8	8.3	11.7	11.9
Sydney - Eastern Suburbs	9.6	11.0	9.3	12.2	9.3	13.1	13.4
Sydney - Inner South West	7.3	8.4	7.1	9.3	7.1	10.1	10.3
Sydney - Inner West	7.7	8.8	7.5	9.8	7.5	10.6	10.8
Sydney - North Sydney and Hornsby	7.6	8.6	7.3	9.6	7.3	10.4	10.6
Sydney - Northern Beaches	7.8	8.9	7.6	9.9	7.6	10.7	10.9
Sydney - Outer South West	7.3	8.4	7.1	9.3	7.1	10.1	10.3
Sydney - Outer West and Blue Mountains	7.3	8.3	7.1	9.3	7.1	10.0	10.2
Sydney - Parramatta	7.8	8.9	7.6	10.0	7.6	10.8	11.0
Sydney - Ryde	7.7	8.8	7.5	9.8	7.5	10.6	10.8
Sydney - South West	7.5	8.6	7.3	9.6	7.3	10.4	10.6
Sydney - Sutherland	7.4	8.4	7.2	9.4	7.2	10.1	10.3
Capital Region	7.2	8.2	7.0	9.2	7.0	9.9	10.1
Central West	7.6	8.7	7.4	9.7	7.4	10.5	10.7
Coffs Harbour - Grafton	7.6	8.7	7.4	9.7	7.4	10.5	10.7

Far West and Orana	7.4	8.4	7.2	9.4	7.2	10.1	10.3
Hunter Valley exc Newcastle	7.1	8.1	6.9	9.0	6.9	9.8	10.0
Illawarra	7.6	8.7	7.4	9.7	7.4	10.5	10.7
Mid North Coast	7.5	8.6	7.3	9.6	7.3	10.3	10.6
Murray	7.6	8.6	7.4	9.6	7.4	10.4	10.6
New England and North West	7.6	8.7	7.4	9.7	7.4	10.5	10.7
Newcastle and Lake Macquarie	7.1	8.1	6.9	9.0	6.9	9.8	9.9
Richmond - Tweed	7.6	8.7	7.4	9.7	7.4	10.5	10.7
Riverina	7.6	8.6	7.4	9.6	7.4	10.4	10.6
Southern Highlands and Shoalhaven	9.0	10.3	8.7	11.4	8.7	12.3	12.6
Melbourne - Inner	4.1	3.9	7.2	9.4	7.2	5.2	5.3
Melbourne - Inner East	3.6	3.4	6.2	8.2	6.2	4.5	4.6
Melbourne - Inner South	3.7	3.5	6.4	8.4	6.4	4.7	4.8
Melbourne - North East	3.8	3.6	6.6	8.6	6.6	4.8	4.9
Melbourne - North West	3.7	3.6	6.5	8.6	6.5	4.7	4.8
Melbourne - Outer East	3.8	3.6	6.6	8.7	6.6	4.8	4.9
Melbourne - South East	3.6	3.4	6.3	8.3	6.3	4.6	4.7
Melbourne - West	3.5	3.4	6.1	8.1	6.1	4.4	4.5
Mornington Peninsula	3.6	3.5	6.4	8.3	6.4	4.6	4.7
Ballarat	4.0	3.8	6.9	9.1	6.9	5.0	5.1
Bendigo	3.8	3.7	6.7	8.8	6.7	4.9	5.0
Geelong	3.7	3.5	6.5	8.5	6.5	4.7	4.8
Hume	4.3	4.1	7.4	9.7	7.4	5.4	5.5
Latrobe - Gippsland	4.1	3.9	7.2	9.4	7.2	5.2	5.3
North West	3.9	3.7	6.8	8.9	6.8	4.9	5.0
Shepparton	4.3	4.1	7.4	9.7	7.4	5.4	5.5
Warrnambool and South West	3.7	3.5	6.5	8.5	6.5	4.7	4.8
Brisbane - East	4.1	5.1	5.1	6.7	5.1	8.1	8.2
Brisbane - North	4.1	5.2	5.1	6.7	5.1	8.1	8.3
Brisbane - South	4.2	5.2	5.2	6.8	5.2	8.2	8.4
Brisbane - West	4.1	5.2	5.1	6.7	5.1	8.2	8.3
Brisbane Inner City	4.2	5.3	5.3	6.9	5.3	8.4	8.6
Ipswich	4.0	5.0	5.0	6.5	5.0	7.9	8.1
Logan - Beaudesert	4.3	5.4	5.3	7.0	5.3	8.4	8.6
Moreton Bay - North	3.9	4.9	4.8	6.4	4.8	7.7	7.9
Moreton Bay - South	3.9	4.9	4.8	6.3	4.8	7.7	7.9
Cairns	4.9	6.2	6.1	8.0	6.1	9.7	9.9
Darling Downs - Maranoa	4.6	5.8	5.7	7.5	5.7	9.1	9.3
Fitzroy	4.2	5.3	5.2	6.9	5.2	8.3	8.5
Gold Coast	4.3	5.5	5.4	7.1	5.4	8.6	8.7
Mackay	4.2	5.3	5.2	6.9	5.2	8.3	8.5
Queensland - Outback	4.7	5.9	5.8	7.6	5.8	9.2	9.4
Sunshine Coast	4.3	5.4	5.3	7.0	5.3	8.5	8.7
Toowoomba	4.6	5.8	5.7	7.5	5.7	9.0	9.2
Townsville	4.7	5.9	5.8	7.6	5.8	9.2	9.4
Wide Bay	4.6	5.8	5.7	7.5	5.7	9.0	9.2
Adelaide - Central and Hills	3.3	3.1	3.3	4.3	3.3	3.7	3.8

Adelaide - North	3.3	3.0	3.3	4.3	3.3	3.7	3.8
Adelaide - South	3.4	3.1	3.4	4.4	3.4	3.8	3.9
Adelaide - West	3.7	3.4	3.7	4.8	3.7	4.1	4.2
Barossa - Yorke - Mid North	3.5	3.2	3.5	4.5	3.5	3.9	4.0
South Australia - Outback	3.7	3.4	3.7	4.8	3.7	4.1	4.2
South Australia - South East	3.1	2.8	3.1	4.0	3.1	3.5	3.5
Mandurah	2.4	2.8	4.0	5.2	4.0	4.6	4.7
Perth - Inner	3.1	3.5	4.9	6.5	4.9	5.8	5.9
Perth - North East	2.9	3.3	4.6	6.1	4.6	5.4	5.5
Perth - North West	2.8	3.2	4.5	5.9	4.5	5.2	5.3
Perth - South East	2.9	3.3	4.7	6.1	4.7	5.5	5.6
Perth - South West	2.7	3.1	4.3	5.7	4.3	5.0	5.1
Bunbury	2.4	2.8	4.0	5.2	4.0	4.6	4.7
Western Australia - Outback	2.8	3.3	4.6	6.0	4.6	5.4	5.5
Western Australia - Wheat Belt	2.6	3.0	4.2	5.5	4.2	4.9	5.0
Greater Hobart	0.9	1.1	1.1	1.4	1.1	1.3	1.3
Launceston and North East	1.3	1.5	1.5	1.9	1.5	1.7	1.8
Tasmania - South East	1.6	1.9	1.9	2.4	1.9	2.2	2.2
Tasmania - West and North West	1.3	1.6	1.6	2.0	1.6	1.8	1.8
Darwin	1.4	1.7	1.0	1.3	1.0	0.9	0.9
Northern Territory - Outback	1.4	1.7	1.0	1.3	1.0	0.9	0.9

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